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Vlad Stirbu

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EXAMINER

AGA, SORI A

ART UNIT

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PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No. 10/587,979	Applicant(s) STIRBU ET AL.	
	Examiner SORI A. AGA	Art Unit 2419	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 03 August 2006.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☐ Claim(s) _____ is/are pending in the application.
 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☐ Claim(s) _____ is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 03 August 2006 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
 Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
 Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
 a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date <u>08/03/2006</u> . | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Claim Rejections - 35 USC § 101

1. 35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

Claims 32-34 are rejected under 35 U.S.C. 101 because the claimed invention is directed

to non- statutory subject matter. The "computer readable recording medium" in accordance with a common knowledge in the art includes signals per se.

Therefore, the claim is directed to transmission media (i.e. carrier wave), which is non statutory. As such, the subject matter of the claims is not patent eligible. Note that amending claim 5 to recite - computer readable storage medium - would overcome this rejection in addition to amend the specification to describe what the computer readable storage medium is.

Claim Rejections - 35 USC § 102

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

2. Claims 16,18,21,22,25,28,29,31,32,34 and 35 are rejected under 35 U.S.C. 102(e) as

being anticipated by Yamamoto (US 2003/0084191) (herein after Yamamoto).

Regarding claim 16, Yamamoto teaches a method of arranging communication in a local area networking system comprising a first device, a second device and an

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intermediate node for arranging data transmission between the first device and the second device, wherein at least the second device is configured to multicast and/or broadcast messages to devices in the system, the method comprising **[see paragraph 0048 lines 5-8 and paragraph 0049 lines 3-10 where a multicast server-4 (second device) sends multicast data including a multicast address which is received by the center node, LAN (Land Area Network) receiver of the center sender and the CMTS (the system); and where the house receiver system connected to a receiver unit-2 (first device) also receives multicast data through the system]:**

checking a destination address of a received packet by the intermediate node; and comparing the destination address of the packet with at least one predetermined multicast and/or broadcast address and preventing in the system the transmission of the packet to the first device if the addresses match **[see paragraph 0049 lines 3-16 where a particular multicast address has been registered with the filter-3 and; If the multicast address of multicast data coincides with the registered multicast address or one of the multicast addresses, the filter discards the multicast data and does not perform the relay operation that would otherwise have been done. See also figure 1, figure 2 and paragraph 0049 lines 1-16 where CATV center-30 (intermediate node) is shown to include the filters that allow transmission of multicast data between the IP network/Internet and the CATV network].**

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Regarding claim 18, Yamamoto teaches a method as claimed in claim 16, wherein the destination address is an Internet Protocol IP address [see **paragph 0005 lines 1-6 where class D IP multicast addresses are given**].

Regarding claim 21, Yamamoto teaches a local area networking system comprising: a first device; a second device; and an intermediate node for arranging data transmission between the first device and the second device [See **figure 1, figure 2 and paragph 0049 lines 1-16 where server-4 (second device) receiver unit-2 (first device) are shown and where CATV center-30 (intermediate node) is shown to include the filters that allow transmission of multicast data between the IP network/Internet and the CATV network**]; wherein at least the second device is configured to multicast and/or broadcast messages to devices in the system, wherein the system is configured to check the destination address of a received packet, the system is configured to compare the destination address of the packet with at least one predetermined multicast and/or broadcast address, and wherein the system is configured to prevent in the system the transmission of the packet to the first device if the addresses match [see **paragaph 0048 lines 5-8 and paragph 0049 lines 3-10 where a multicast server-4 (second device) sends multicast data including a multicast address which is received by the center node, LAN (Land Area Network) receiver of the center sender and the CMTS (the system); and where the house receiver**

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system connected to a receiver unit-2 (first device) also receives multicast data through the system; See also paragraph 0049 lines 3-16 where a particular multicast address has been registered with the filter-3 and; If the multicast address of multicast data coincides with the registered multicast address or one of the multicast addresses, the filter discards the multicast data and does not perform the relay operation that would otherwise have been done].

Regarding claim 22, Yamamoto teaches a data processing device for a local area networking system, the data processing device being an intermediate node arranging data transmission between a first device and a second device, wherein the data processing device is configured to check the destination address of a received packet, the data processing device is configured to compare the destination address of the packet with at least one predetermined multicast and/or broadcast address, the data processing device is configured to prevent the transmission of the packet in the system to the first device if the addresses match [see paragraph 0048 lines 5-8 and paragraph 0049 lines 3-10 where a multicast server-4 (second device) sends multicast data including a multicast address which is received by the center node, LAN (Land Area Network) receiver of the center sender and the CMTS (the system); and where the house receiver system connected to a receiver unit-2 (first device) also receives multicast data through the system; See also paragraph 0049 lines 3-16 where a

particular multicast address has been registered with the filter-3 and; If the multicast address of multicast data coincides with the registered multicast address or one of the multicast addresses, the filter discards the multicast data and does not perform the relay operation that would otherwise have been done. See also figure 1, figure 2 and paragraph 0049 lines 1-16 where CATV center-30 (intermediate node) is shown to include the filters that allow transmission of multicast data between the IP network/Internet and the CATV network].

Regarding claim 25, Yamamoto teaches a data processing device according to claim 22, wherein the destination address is an Internet Protocol IP address [see paragraph 0005 lines 1-6 where class-D IP multicast addresses are given].

Regarding claim 28, Yamamoto teaches a data processing device according to claim 22, wherein the data processing device is configured to compare one or more properties of the message to the properties specified in predetermined transmission conditions to determine whether the message should be transferred to the first device [see paragraph 0049 lines 3-16 where a particular multicast address has been registered with the filter-3 and; If the multicast address of multicast data coincides with the registered multicast address (predetermined transmission condition) or one of the multicast addresses, the

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filter discards the multicast data and does not perform the relay operation that would otherwise have been done].

Regarding claim 29, Yamamoto teaches a module for controlling a data processing device for a local area networking system, wherein: the module is configured to check the destination address of a received packet, the module is configured to compare the destination address of the packet with at least one predetermined multicast and/or broadcast address, and wherein the module is configured to prevent the transmission of the packet in the system to a first device if the addresses match [see paragraph 0048 lines 5-8 and paragraph 0049 lines 3-10 where a multicast server-4 (second device) sends multicast data including a multicast address which is received by the center node, LAN (Land Area Network) receiver of the center sender and the CMTS (the system); and where the house receiver system connected to a receiver unit-2 (first device) also receives multicast data through the system; See also paragraph 0049 lines 3-16 where a particular multicast address has been registered with the filter-3 and; If the multicast address of multicast data coincides with the registered multicast address or one of the multicast addresses, the filter discards the multicast data and does not perform the relay operation that would otherwise have been done. See also figure 1, figure 2 and paragraph 0049 lines 1-16 where CATV center-30 (Module) is shown to include the filters

that allow transmission of multicast data between the IP network/Internet and the CATV network].

Regarding claim 31, Yamamoto teaches a module according to claim 29, wherein the module is arranged to compare one or more properties of the message to properties specified in predetermined transmission conditions to determine whether the message should be transferred to the first device [see paragraph 0049 lines 3-16 where a particular multicast address has been registered with the filter-3 and; If the multicast address of multicast data coincides with the registered multicast address (predetermined transmission condition) or one of the multicast addresses, the filter discards the multicast data and does not perform the relay operation that would otherwise have been done].

Regarding claim 32, Yamamoto teaches a computer readable medium storing a computer program product [see paragraph 0082 line 82 where a memory is used] for controlling a data processing device for a local area networking system by executing program code included in the computer program product in a processor of the data processing device, the computer program product comprising a program code portion for causing the data processing device to check a destination address of a received packet, a program code portion for causing the data processing device to compare the destination address of the

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packet with at least one predetermined multicast and/or broadcast address, a program code portion for causing the data processing device to prevent transmission of the packet in the system to a first device if the addresses match match [see paragraph 0048 lines 5-8 and paragraph 0049 lines 3-10 where a **multicast server-4 (second device) sends multicast data including a multicast address which is received by the center node, LAN (Land Area Network) receiver of the center sender and the CMTS (the system); and where the house receiver system connected to a receiver unit-2 (first device) also receives multicast data through the system; See also paragraph 0049 lines 3-16 where a particular multicast address has been registered with the filter-3 and; If the multicast address of multicast data coincides with the registered multicast address or one of the multicast addresses, the filter discards the multicast data and does not perform the relay operation that would otherwise have been done. See also figure 1, figure 2 and paragraph 0049 lines 1-16 where CATV center-30 (Module) is shown to include the filters that allow transmission of multicast data between the IP network/Internet and the CATV network].**

Regarding claim 34, Yamamoto teaches a computer readable medium according to claim 32, wherein the computer program product comprises a program code portion for causing the data processing device to compare one or more properties of the message to properties specified in predetermined transmission conditions to

determine whether the message should be transferred to the first device [see **paragraph 0049 lines 3-16 where a particular multicast address has been registered with the filter-3 and; If the multicast address of multicast data coincides with the registered multicast address (predetermined transmission condition) or one of the multicast addresses, the filter discards the multicast data and does not perform the relay operation that would otherwise have been done].**

Regarding claim 35, Yamamoto teaches a data processing device for a local area networking system, the data processing device comprising: means for checking a destination address of a received packet; means for comparing the destination address of the packet with at least one predetermined multicast and/or broadcast address, and means for preventing transmission of the packet in the system to a first device if the addresses match [see **paragraph 0048 lines 5-8 and paragraph 0049 lines 3-10 where a multicast server-4 (second device) sends multicast data including a multicast address which is received by the center node, LAN (Land Area Network) receiver of the center sender and the CMTS (the system); and where the house receiver system connected to a receiver unit-2 (first device) also receives multicast data through the system; See also paragraph 0049 lines 3-16 where a particular multicast address has been registered with the filter-3 and; If the multicast address of multicast data coincides with the registered multicast address or one of the multicast**

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addresses, the filter discards the multicast data and does not perform the relay operation that would otherwise have been done. See also figure 1, figure 2 and paragraph 0049 lines 1-16 where CATV center-30 (Module) is shown to include the filters that allow transmission of multicast data between the IP network/Internet and the CATV network].

Claim Rejections - 35 USC § 103

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. Claims 17,19,20,23,24,26,27,30 and 33 rejected under 35 U.S.C. 103(a) as being unpatentable over Yamamoto as applied to claims 16,18,21,22,25,28,29,31,32,34 and 35 above and further in view of Vasisht (US 2004/0133689).

Regarding claim 17, Yamamoto teaches the method as claimed in claim 16 as discussed above. However, Yamamoto does not explicitly teach the intermediate node is configured to connect networks that use different data transmission protocols. However, Vasisht teaches using more than one protocol to connect a subscriber system with an ISP (network) [see **paragraph 0041 lines 3-10**]. It would have been obvious for a person having ordinary skill in the art to enable center-30 in Yamamoto connect networks using different protocols. This will

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enable inter-working between various systems offering a range of uses which gives the user choices.

Regarding claim 19, Yamamoto teaches a method as claimed in claim 16 as discussed above. However, Yamamoto does not explicitly teach the first device belongs to a Mobile Handheld Subcommittee MHS domain of a Universal Plug and Play UPnP system and the second device belongs to a Home Network version 1 domain of the Universal Plug and Play system. However, Vashisht teaches using UPnP in one of the networks [**paragraph 0051 line 24**]. It would have been obvious for a person having ordinary skill in the art to utilize UPnP (various versions include MHS and Home network version) in one of the networks. UPnP (both the Home network and MHS versions) is desirable because it allows devices to connect seamlessly.

Regarding claim 20, Yamamoto teaches a method as claimed in claim 19 including preventing multicast messages to the first device as discussed above. However, Yamamoto does not explicitly teach Universal Plug and Play-UPnP. However, Vashisht teaches using UPnP in one of the networks [**paragraph 0051 line 24**]. It would have been obvious for a person having ordinary skill in the art to utilize UPnP in one of the networks. UPnP is desirable because it allows devices to connect seamlessly.

Regarding claim 23, Yamamoto teaches a data processing device according to claim 22 as discussed above. However, Yamamoto does not explicitly teach the intermediate node is configured to connect networks that use different data transmission protocols. However, Vashisht teaches using more than one protocol to connect a subscriber system with an ISP (network) [see **paragraph 0041 lines 3-10**]. It would have been obvious for a person having ordinary skill in the art to enable center-30 in Yamamoto connect networks using different protocols. This will enable inter-working between various systems offering a range of uses which gives the user choices.

Regarding claim 24, Yamamoto teaches a data processing device according to claim as discussed above. However, Yamamoto does not explicitly teach the data processing device is configured to perform data transmission between an IEEE 802- based network to which the second device belongs and a Bluetooth network to which the first device belongs [see **paragraph 0051 lines 23-25**]. However, Vasisht teaches a LAN can support various communication link protocols such as WiFi (802- based network) and BlueToothTM to which the devices can be connected. It would have been obvious for a person having ordinary skill in the art to include a BluetoothTM and WiFi network technologies to support the LAN according to the pre-integrated interfaces cards that might come with devices a user might be interested in utilizing.

Regarding claim 26, Yamamoto teaches a data processing device according to claim 22 as discussed above. However, Yamamoto does not explicitly teach the first device belongs to a Mobile Handheld Subcommittee MHS domain of a Universal Plug and Play UPnP system and the second device belongs to a Home Network version 1 domain of the Universal Plug and Play system. However, Vashisht teaches using UPnP in one of the networks **[paragraph 0051 line 24]**. It would have been obvious for a person having ordinary skill in the art to utilize UPnP (various versions include MHS and Home network version) in one of the networks. UPnP (both the Home network and MHS versions) is desirable because it allows devices to connect seamlessly.

Regarding claim 27, Yamamoto teaches a data processing device according to claim 25, wherein the data processing device is configured to prevent transmission of a multicast messages to the first device, and the data processing device is configured to forward at least the broadcast messages relating to address acquisition to the first device **[see paragraph 0049 lines 3-16 where a particular multicast address has been registered with the filter-3 and; If the multicast address of multicast data coincides with the registered multicast address or one of the multicast addresses, the filter discards the multicast data and does not perform the relay operation that would otherwise have been done and wherein multicast packets are transmitted if the address does not match]**.

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However, Yamamoto does not explicitly teach Universal Plug and Play-UPnP.

However, Vashisht teaches using UPnP in one of the networks **[paragraph 0051 line 24]**. It would have been obvious for a person having ordinary skill in the art to utilize UPnP in one of the networks. UPnP is desirable because it allows devices to connect seamlessly.

Regarding claim 30, Yamamoto teaches a module as claimed in claim 29

including preventing multicast messages to the first device as discussed above.

However, Yamamoto does not explicitly teach Universal Plug and Play-UPnP.

However, Vashisht teaches using UPnP in one of the networks **[paragraph 0051 line 24]**. It would have been obvious for a person having ordinary skill in the art to utilize UPnP in one of the networks. UPnP is desirable because it allows devices to connect seamlessly.

Regarding claim 33, Yamamoto teaches a computer readable medium according

to claim 32 including preventing multicast messages to the first device as

discussed above. However, Yamamoto does not explicitly teach Universal Plug

and Play-UPnP. However, Vashisht teaches using UPnP in one of the networks

[paragraph 0051 line 24]. It would have been obvious for a person having

ordinary skill in the art to utilize UPnP in one of the networks. UPnP is desirable

because it allows devices to connect seamlessly.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to SORI A. AGA whose telephone number is (571)270-1868. The examiner can normally be reached on M-F 7:30-4:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Edan Orgad can be reached on (571)272-7884. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/S. A. A./
Examiner, Art Unit 2419

/Edan Orgad/
Supervisory Patent Examiner, Art Unit 2419